

Experiment Number: 02200-04

Test Type: 90-DAY

Route: RESPIRATORY EXPOSURE WHOLE BODY

Species/Strain: Mouse/B6C3F1

P03: INCIDENCE RATES OF NON-NEOPLASTIC LESIONS BY ANATOMIC SITE (a)

Test Compound: Styrene

CAS Number: 100-42-5

Date Report Requested: 10/18/2014

Time Report Requested: 15:25:56

First Dose M/F: NA / NA

Lab: BNW

C Number:	C02200B
Lock Date:	05/26/1992
Cage Range:	All
Date Range:	All
Reasons For Removal:	All
Removal Date Range:	All
Treatment Groups:	All
Study Gender:	Both
PWG Approval Date	NONE

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B6C3F1 Mouse MALE	CONTROL	62.5 PPM	125 PPM	250 PPM	500 PPM
Disposition Summary					
Animals Initially In Study	10	10	10	10	10
Early Deaths					
Moribund Sacrifice				1	
Natural Death				5	
Survivors					
Terminal Sacrifice	10	10	10	4	10
Animals Examined Microscopically	10	10	10	10	10

ALIMENTARY SYSTEM

Esophagus	(10)	(0)	(10)	(10)	(10)
Gallbladder	(8)	(0)	(8)	(8)	(10)
Intestine Large, Cecum	(10)	(0)	(10)	(10)	(10)
Intestine Large, Colon	(10)	(0)	(9)	(10)	(10)
Intestine Large, Rectum	(10)	(0)	(10)	(10)	(9)
Intestine Small, Duodenum	(10)	(0)	(10)	(8)	(10)
Intestine Small, Ileum	(10)	(0)	(10)	(9)	(10)
Intestine Small, Jejunum	(10)	(0)	(10)	(9)	(10)
Liver	(10)	(1)	(10)	(10)	(10)
Basophilic Focus					1 (10%)
Centrilobular, Cytomegaly				2 (20%)	10 (100%)
Centrilobular, Inflammation					9 (90%)
Centrilobular, Karyomegaly					10 (100%)
Centrilobular, Necrosis				6 (60%)	10 (100%)
Hemorrhage, Focal			1 (10%)		
Mineralization				4 (40%)	3 (30%)
Pancreas	(10)	(0)	(10)	(10)	(10)
Salivary Glands	(10)	(0)	(10)	(10)	(10)
Stomach, Forestomach	(10)	(10)	(10)	(10)	(10)
Epithelium, Hyperplasia		7 (70%)	7 (70%)	2 (20%)	10 (100%)

a - Number of animals examined microscopically at site and number of animals with lesion

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Lab: BNW

B6C3F1 Mouse MALE	CONTROL	62.5 PPM	125 PPM	250 PPM	500 PPM
Inflammation, Suppurative Ulcer		1 (10%)	1 (10%)	1 (10%)	
Stomach, Glandular	(10)	(10)	(10)	(10)	(10)
Mineralization				4 (40%)	2 (20%)
Muscularis, Mineralization				3 (30%)	2 (20%)
CARDIOVASCULAR SYSTEM					
Blood Vessel	(9)	(0)	(10)	(9)	(10)
Heart	(10)	(0)	(10)	(10)	(10)
Cardiomyopathy	1 (10%)		1 (10%)		
Hemorrhage				3 (30%)	
Mineralization				3 (30%)	3 (30%)
ENDOCRINE SYSTEM					
Adrenal Cortex	(10)	(0)	(10)	(10)	(10)
Hypertrophy	1 (10%)				
Adrenal Medulla	(10)	(0)	(10)	(10)	(10)
Islets, Pancreatic	(10)	(0)	(10)	(10)	(10)
Parathyroid Gland	(4)	(0)	(7)	(4)	(5)
Pituitary Gland	(9)	(0)	(10)	(10)	(9)
Thyroid Gland	(10)	(0)	(10)	(10)	(10)
GENERAL BODY SYSTEM					
None					
GENITAL SYSTEM					
Epididymis	(10)	(0)	(10)	(10)	(10)
Preputial Gland	(10)	(0)	(10)	(10)	(10)
Prostate	(10)	(0)	(10)	(10)	(10)
Seminal Vesicle	(10)	(0)	(10)	(10)	(10)
Testes	(10)	(0)	(10)	(10)	(10)
Mineralization				2 (20%)	

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B6C3F1 Mouse MALE	CONTROL	62.5 PPM	125 PPM	250 PPM	500 PPM
HEMATOPOIETIC SYSTEM					
Bone Marrow	(10)	(0)	(10)	(10)	(10)
Lymph Node, Bronchial	(4)	(0)	(3)	(6)	(8)
Lymph Node, Mandibular	(7)	(0)	(9)	(9)	(8)
Lymph Node, Mediastinal	(5)	(0)	(5)	(5)	(2)
Lymph Node, Mesenteric	(10)	(0)	(9)	(9)	(9)
Necrosis				4 (44%)	
Spleen	(10)	(1)	(10)	(10)	(10)
Pigmentation, Melanin		1 (100%)			
Thymus	(10)	(0)	(10)	(10)	(10)
Necrosis				6 (60%)	
INTEGUMENTARY SYSTEM					
Skin	(10)	(0)	(10)	(10)	(9)
MUSCULOSKELETAL SYSTEM					
Bone	(10)	(0)	(10)	(10)	(10)
NERVOUS SYSTEM					
Brain	(10)	(0)	(10)	(10)	(10)
Granuloma			1 (10%)		
RESPIRATORY SYSTEM					
Larynx	(10)	(0)	(10)	(10)	(10)
Metaplasia, Squamous					3 (30%)
Lung	(10)	(10)	(10)	(10)	(10)
Bronchiole, Degeneration		10 (100%)	10 (100%)	10 (100%)	10 (100%)
Hemorrhage	1 (10%)				
Inflammation				6 (60%)	1 (10%)
Nose	(10)	(10)	(10)	(10)	(10)
Nasolacrim Dct, Inflammation, Suppurative				2 (20%)	
Nasopharyn Dct, Cytoplasmic Alteration					1 (10%)

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B6C3F1 Mouse MALE	CONTROL	62.5 PPM	125 PPM	250 PPM	500 PPM
Olfactory Epi, Degeneration		10 (100%)	10 (100%)	4 (40%)	10 (100%)
Olfactory Epi, Inflammation, Suppurative			7 (70%)	8 (80%)	10 (100%)
Olfactory Epi, Metaplasia		10 (100%)	10 (100%)	3 (30%)	4 (40%)
Olfactory Epi, Metaplasia, Squamous					1 (10%)
Olfactory Epi, Necrosis				6 (60%)	
Trachea	(10)	(0)	(10)	(10)	(10)
SPECIAL SENSES SYSTEM					
None					
URINARY SYSTEM					
Kidney	(10)	(0)	(10)	(10)	(10)
Cortex, Renal Tubule, Mineralization				2 (20%)	
Cortex, Renal Tubule, Necrosis				6 (60%)	
Urinary Bladder	(10)	(0)	(9)	(10)	(10)
Dilatation					1 (10%)

END OF MALE DATA

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Lab: BNW

B6C3F1 Mouse FEMALE	CONTROL	62.5 PPM	125 PPM	250 PPM	500 PPM
Disposition Summary					
Animals Initially In Study	10	10	10	10	10
Early Deaths					
Survivors					
Terminal Sacrifice	10	10	10	10	10
Animals Examined Microscopically	10	10	10	10	10
ALIMENTARY SYSTEM					
Esophagus	(9)	(0)	(0)	(0)	(10)
Gallbladder	(8)	(0)	(0)	(0)	(10)
Intestine Large, Cecum	(10)	(0)	(0)	(0)	(10)
Intestine Large, Colon	(10)	(0)	(0)	(0)	(10)
Intestine Large, Rectum	(10)	(0)	(0)	(0)	(10)
Intestine Small, Duodenum	(10)	(0)	(0)	(0)	(10)
Intestine Small, Ileum	(10)	(0)	(0)	(0)	(10)
Intestine Small, Jejunum	(10)	(0)	(0)	(0)	(10)
Liver	(10)	(1)	(10)	(10)	(10)
Centrilobular, Cytomegaly				9 (90%)	10 (100%)
Centrilobular, Inflammation				8 (80%)	10 (100%)
Centrilobular, Karyomegaly				7 (70%)	10 (100%)
Centrilobular, Necrosis				3 (30%)	6 (60%)
Hemorrhage, Focal		1 (100%)			
Mineralization				9 (90%)	2 (20%)
Pancreas	(10)	(0)	(0)	(0)	(10)
Duct, Cyst	1 (10%)				
Salivary Glands	(10)	(0)	(0)	(0)	(10)
Stomach, Forestomach	(10)	(10)	(10)	(10)	(10)
Epithelium, Hyperplasia		7 (70%)	10 (100%)	10 (100%)	7 (70%)
Ulcer		2 (20%)	3 (30%)	4 (40%)	
Stomach, Glandular	(10)	(10)	(10)	(10)	(10)

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B6C3F1 Mouse FEMALE	CONTROL	62.5 PPM	125 PPM	250 PPM	500 PPM
Mineralization				1 (10%)	
Muscularis, Mineralization		2 (20%)	3 (30%)	3 (30%)	
CARDIOVASCULAR SYSTEM					
Blood Vessel	(10)	(0)	(0)	(0)	(9)
Heart	(10)	(0)	(10)	(10)	(10)
Mineralization				3 (30%)	1 (10%)
ENDOCRINE SYSTEM					
Adrenal Cortex	(10)	(10)	(10)	(10)	(10)
Degeneration		10 (100%)	9 (90%)	10 (100%)	10 (100%)
Adrenal Medulla	(10)	(10)	(10)	(10)	(10)
Islets, Pancreatic	(10)	(0)	(0)	(0)	(10)
Parathyroid Gland	(4)	(0)	(0)	(0)	(7)
Pituitary Gland	(9)	(0)	(0)	(0)	(9)
Thyroid Gland	(10)	(0)	(0)	(0)	(10)
GENERAL BODY SYSTEM					
None					
GENITAL SYSTEM					
Clitoral Gland	(9)	(0)	(0)	(0)	(10)
Ovary	(10)	(0)	(0)	(1)	(10)
Cyst				1 (100%)	
Uterus	(10)	(0)	(0)	(0)	(10)
HEMATOPOIETIC SYSTEM					
Bone Marrow	(10)	(0)	(0)	(0)	(10)
Lymph Node, Bronchial	(9)	(0)	(0)	(0)	(8)
Lymph Node, Mandibular	(9)	(0)	(0)	(0)	(8)
Lymph Node, Mediastinal	(2)	(0)	(0)	(0)	(2)
Lymph Node, Mesenteric	(10)	(0)	(0)	(0)	(9)
Spleen	(10)	(0)	(0)	(0)	(10)

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B6C3F1 Mouse FEMALE	CONTROL	62.5 PPM	125 PPM	250 PPM	500 PPM
Thymus	(10)	(0)	(0)	(0)	(10)
INTEGUMENTARY SYSTEM					
Mammary Gland	(10)	(0)	(0)	(0)	(10)
Skin	(10)	(0)	(0)	(0)	(10)
MUSCULOSKELETAL SYSTEM					
Bone	(10)	(0)	(0)	(0)	(10)
NERVOUS SYSTEM					
Brain	(10)	(0)	(0)	(0)	(10)
RESPIRATORY SYSTEM					
Larynx	(10)	(0)	(10)	(10)	(10)
Metaplasia, Squamous				4 (40%)	5 (50%)
Lung	(10)	(10)	(10)	(10)	(10)
Arteriole, Hypertrophy			4 (40%)	1 (10%)	
Arteriole, Inflammation			5 (50%)	2 (20%)	
Bronchiole, Degeneration		10 (100%)	10 (100%)	10 (100%)	10 (100%)
Hemorrhage				1 (10%)	
Nose	(10)	(10)	(10)	(10)	(10)
Olfactory Epi, Degeneration		10 (100%)	10 (100%)	10 (100%)	10 (100%)
Olfactory Epi, Inflammation, Suppurative				5 (50%)	9 (90%)
Olfactory Epi, Metaplasia		10 (100%)	10 (100%)	10 (100%)	10 (100%)
Olfactory Epi, Metaplasia, Squamous					1 (10%)
Trachea	(10)	(0)	(0)	(0)	(10)
SPECIAL SENSES SYSTEM					
None					
URINARY SYSTEM					
Kidney	(10)	(0)	(0)	(0)	(10)
Urinary Bladder	(10)	(0)	(0)	(0)	(10)

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B6C3F1 Mouse FEMALE

CONTROL

62.5 PPM

125 PPM

250 PPM

500 PPM

**** END OF REPORT ****